

# Water Gauges & Accessories

## 20-100 & 20-150 Series



### Standard Pattern Bronze Water Gauges

Use for all types of liquid level verification; available with 3/8" or 1/2" NPT male pipe connections. Aluminum or plastic composition hand wheels; EPDM gauge glass gaskets standard. Other glass gaskets available.

- Ball checks standard for **20-150** models
- Equipped with two copper guard rods
- Standard 1/4" needle drain valve in lower arm
- Rated: 125 psig @ 350°F, 300 psig @ 100°F (See note!)
- CRN Registered

Model Number	Pipe Size (In.)	Glass O.D. & Length	Wt./100 (Lbs.)	Wheel Type
20-101	3/8	5/8 x 10	145	ALUMINUM
20-102	3/8	5/8 x 10	145	COMPOSITION
20-104	1/2	5/8 x 12	160	ALUMINUM
20-105	1/2	5/8 x 12	160	COMPOSITION
20-150	1/2	5/8 x 12	160	ALUMINUM
20-151	1/2	5/8 x 12	160	COMPOSITION

*Note: Service ratings are subject to pressure/temperature ratings of gauge glass and glass gaskets.*

## Water Gauges & Accessories

### 20-200, 20-250 & 25-200 Series



#### Heavy Pattern Bronze Water Gauges

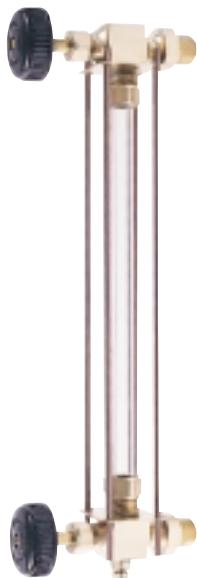
All standard 20 Series features but with a heavier valve body pattern for higher service ratings.

- Available with 3/8, 1/2 and 3/4 MNPT fittings
- Ball checks standard on **20-250** models
- Polished finish on **25-200** valves
- Rated: 200 psig @ 400°F, 400 psig @ 100°F (See note!)
- CRN Registered

Model Number	Pipe Size (In.)	Glass O.D. & Length	Wt./100 (Lbs.)	Wheel Type
20-201	3/8	5/8 x 10	185	ALUMINUM
20-202	3/8	5/8 x 10	189	COMPOSITION
20-204	1/2	5/8 x 12	205	ALUMINUM
20-205	1/2	5/8 x 12	205	COMPOSITION
20-207	3/4	3/4 x 16	270	ALUMINUM
20-208	3/4	3/4 x 16	270	COMPOSITION
20-250	1/2	5/8 x 12	195	ALUMINUM
20-251	1/2	5/8 x 12	200	COMPOSITION
20-253	3/4	3/4 x 16	355	ALUMINUM
20-254	3/4	3/4 x 16	360	COMPOSITION
25-201	3/8	5/8 x 10	180	ALUMINUM
25-202	3/8	5/8 x 10	185	COMPOSITION
25-204	1/2	5/8 x 12	190	ALUMINUM
25-205	1/2	5/8 x 12	190	COMPOSITION
25-207	3/4	3/4 x 16	290	ALUMINUM
25-208	3/4	3/4 x 16	295	COMPOSITION

Note: Service ratings are subject to pressure/temperature ratings of gauge glass and glass gaskets.

### 20-300, 20-350, 25-400 & 25-500 Series



#### Square Pattern Bronze Water Gauges

Available with 1/2" (ASTM B-16 brass bar stock) or 3/4" (B-584 cast bronze) NPT male pipe connections. Four guard rods and EPDM gauge glass gaskets standard. Other glass gaskets available.

- Standard 1/4" needle drain valve in lower arm
- Pet cock or Apollo® ball valve drain on request
- Polished finish on **25-400** and **25-500**
- Ball checks standard on **20-350** and **25-500**
- Rated: 200 psig @ 400°F, 400 psig @ 100°F
- Except for **25-400** (See note!)
- **25-400** Rated=125 psig@350°F, 300 psig@100°F (See note!)
- CRN Registered

Model Number	Pipe Size (In.)	Glass O.D. & Length	Wt./100 (Lbs.)	Wheel Type
20-304	1/2	5/8 x 12	260	ALUMINUM
20-305	1/2	5/8 x 12	270	COMPOSITION
20-307	3/4	3/4 x 16	345	ALUMINUM
20-308	3/4	3/4 x 16	365	COMPOSITION
20-350	1/2	5/8 x 12	265	ALUMINUM
20-351	1/2	5/8 x 12	265	COMPOSITION
20-353	3/4	3/4 x 16	360	ALUMINUM
20-354	3/4	3/4 x 16	365	COMPOSITION
25-404	1/2	5/8 x 12	285	ALUMINUM
25-405	1/2	5/8 x 12	285	COMPOSITION
25-407	3/4	3/4 x 16	350	ALUMINUM
25-408	3/4	3/4 x 16	350	COMPOSITION
25-501	1/2	5/8 x 12	290	ALUMINUM
25-502	1/2	5/8 x 12	290	COMPOSITION
25-504	3/4	3/4 x 16	355	ALUMINUM
25-505	3/4	3/4 x 16	355	COMPOSITION

Note: Service ratings are subject to pressure/temperature ratings of gauge glass and glass gaskets.

# Water Gauges & Accessories

## 20-400 & 20-410 Series



### Side Mounted Handwheel Water Gauges

Side-mounted handwheels allow water gauge operation in hard to reach places; with all the **20 Series** design features.

- Ideal for concealed jacketed type boilers
- No guard rod brackets: **20-405, 20-406, 20-410**
- Brackets and guard rods standard: **20-407, 20-408**
- EPDM standard gauge glass gasket
- Compact - requires minimum space
- Standard 1/4" needle drain valve
- Rated: 125 psig @ 350°F, 300 psig @ 100°F (See note!)
- 1-1/4" Extended shank length; 20-410
- CRN Registered

Model Number	Pipe Size (In.)	Glass O.D. & Length	Wt./100 (Lbs.)	Wheel Type
20-405-00 RH	1/2	5/8 x 12	165	ALUMINUM
20-406-00 LH	1/2	5/8 x 12	165	ALUMINUM
20-407-00 RH	1/2	5/8 x 12	170	ALUMINUM
20-408-00 LH	1/2	5/8 x 12	170	ALUMINUM
20-410-00 LH	1/2	5/8 x 12	180	ALUMINUM

*Note: Service ratings are subject to pressure/temperature ratings of gauge glass and glass gaskets.*

## 20-700 & 20-710 Series



### Simple Expansion Tank Gauges

Available with 3/8" or 1/2" MNPT connections; EPDM gauge glass gaskets and 1/4" needle drain valve in lower arm are both standard.

- **20-710** has plug in top arm to insert glass straight through
- 1/4" pet cock or Apollo® ball valve optional
- Ball checks on request (**20-704** only)
- Rated: 125 psig @ 350°F, 300 psig @ 100°F (See note!)
- CRN Registered

Model Number	Pipe Size (In.)	Glass O.D. & Length	Wt./100 (Lbs.)
20-703-00	3/8	5/8 x 10	120
20-704-00	1/2	5/8 x 12	135
20-713-00	3/8	5/8 x 10	120
20-714-00	1/2	5/8 x 12	135

*Note: Service ratings are subject to pressure/temperature ratings of gauge glass and glass gaskets.*

# Water Gauges & Accessories

## 23-600 Series



### Stainless Steel Expansion Tank Gauges

Holds all 316 stainless steel-compatible liquids. In lower arm: shut-off valve and stainless steel drain valve.

- Two stainless steel guard rods
- Rated: 250 psig at 406°F: maximum working pressure (See note!)
- Standard PTFE reinforced gauge glass gaskets
- High pressure glass standard
- CRN Registered

Model Number	Pipe Size (In.)	Glass O.D. & Length	Wt./100 (Lbs.)	Wheel Type
23-651-00	1/2	5/8 x 12	225	ALUMINUM
23-654-00	3/4	5/8 x 12	225	COMPOSITION

*Note: Service ratings are subject to pressure/temperature ratings of gauge glass and glass gaskets.*

## 20-600 & 20-800 Series



### Bronze Expansion Tank Gauges

Bottom arm shut-off valve prevents water leaks during gauge glass changes.

- EPDM standard gauge glass gasket
- 20-800 models: 1/4" NPT pipe thread in upper arm for pressure gauge standard
- Rated: 200 psig @ 400°F, 400 psig @ 100°F (See note!)
- CRN Registered

Model Number	Pipe Size (In.)	Glass O.D. & Length	Wt./100 (Lbs.)	Wheel Type
20-604-00*	1/2	5/8 x 12	155	ALUMINUM
20-605-00*	1/2	5/8 x 12	175	COMPOSITION
20-804-00*	1/2	5/8 x 12	160	ALUMINUM
20-805-00*	1/2	5/8 x 12	160	COMPOSITION

*\*Automatic model*

*Note: Service ratings are subject to pressure/temperature ratings of gauge glass and glass gaskets.*

## Water Gauges & Accessories

### 24-600 & 24-650 Series



#### Chain Lever Water Gauges

Lever on standard 12-foot chain allows operator to open and close valves that would be beyond reach. Valve stems operate on quarter-turns.

- Rated 250 psig @ 400°F, 500 psig @ 100°F (See note!)
- Use on large boilers with inconvenient columns
- Automatic and non-automatic models
- Furnished with 12 feet of chain
- High pressure glass standard with the 24 series
- CRN Registered
- Standard PTFE reinforced gauge glass gasket

Model Number	Pipe Size (In.)	Glass O.D. & Length	Wt./100 (Lbs.)
24-601-00	1/2	5/8 x 12	515
24-602-00	3/4	3/4 x 16	580
24-651-00*	1/2	5/8 x 12	515
24-652-00*	3/4	3/4 x 16	580

\* Automatic model

Note: Service ratings are subject to pressure/temperature ratings of gauge glass and glass gaskets.

### 20-600 & 25-600 Series



#### Chain Lever Water Gauges

Lever on standard 12-foot chain allows operator to open and close valves that would be beyond reach. Valve stems operate on quarter-turns.

- Quick opening, non-automatic
- Service rating: 250 psig @ 400°F, 500 psig @ 100°F (See note!)
- EPDM standard gauge glass gasket
- Standard 1/4" needle drain valve
- Furnished with 12 feet of chain
- H-2485 pull handle available
- CRN Registered

Model Number	Pipe Size (In.)	Glass O.D. & Length	Wt./100 (Lbs.)
25-601-00*	1/2	5/8 x 12	335
25-602-00*	3/4	3/4 x 16	350
20-601-00**	1/2	5/8 x 12	370
20-602-00**	3/4	3/4 x 16	435

\* Polished Finish

Note: Service ratings are subject to pressure/temperature ratings of gauge glass and glass gaskets.

\*\* Ball valve not included. Includes 1/4" needle drain.

## Water Gauges & Accessories

### 24-300 & 24-350 Series

Automatic and non-automatic direct reading gauges in shank pipe sizes 1/2" and 3/4".



- Heavy pattern bronze valve body
- Guard rod bracket to accommodate four guard rods
- Drain valve - 5/16 diameter full-blow ball valve with safety handle
- PTFE reinforced gauge glass gasket and stem packing are standard
- Rated 250 psig @ 400°F, 500 psig @ 100°F (See note!)
- Automatic - conforms to ASME power boiler code requirements for automatic water gauges; ball checks in upper and lower arms
- High pressure gauge glass and gaskets are standard
- CRN Registered

	Model Number	Pipe Size (In.)	Glass O.D. & Length	Wt./100 (Lbs.)	Wheel Type
Non-Automatic	24-301-00	1/2	5/8 x 12	425	ALUMINUM
	24-302-00	1/2	5/8 x 12	425	COMPOSITION
	24-304-00	3/4	3/4 x 16	490	ALUMINUM
	24-305-00	3/4	3/4 x 16	490	COMPOSITION
Automatic	24-350-00	1/2	5/8 x 12	425	ALUMINUM
	24-351-00	1/2	5/8 x 12	425	COMPOSITION
	24-353-00	3/4	3/4 x 16	490	ALUMINUM
	24-354-00	3/4	3/4 x 16	490	COMPOSITION

Note: Service ratings are subject to pressure/temperature ratings of gauge glass and glass gaskets.

### 21 Series



#### Rough Bronze Water Gauges With Extended Shank

Available with 3/8" or 1/2" MNPT connections; EPDM gauge glass gaskets and 1/4" needle drain valve in lower arm are both standard.

- 1-3/4" standard shank length; for 1-1/4" shank length, use - 07 suffix
- **21-100** rated 125 psig @ 350°F, 300 psig @ 100°F
- **21-200** rated 200 psig @ 400°F, 400 psig @ 100°F (See note!)
- CRN Registered
- Equipped with two copper guard rods

Model Number	Pipe Size (In.)	Glass O.D. & Length	Wt./100 (Lbs.)	Wheel Type
21-101	3/8	5/8 x 10	163	ALUMINUM
21-102	3/8	5/8 x 10	175	COMPOSITION
21-104	1/2	5/8 x 12	185	ALUMINUM
21-105	1/2	5/8 x 12	197	COMPOSITION
21-150*	1/2	5/8 x 12	195	ALUMINUM
21-151*	1/2	5/8 x 12	207	COMPOSITION
21-204	1/2	5/8 x 12	215	ALUMINUM
21-205	1/2	5/8 x 12	219	COMPOSITION
21-250*	1/2	5/8 x 12	215	ALUMINUM
21-251*	1/2	5/8 x 12	215	COMPOSITION

\* Automatic Model

Note: Service ratings are subject to pressure/temperature ratings of gauge glass and glass gaskets.

# Water Gauges & Accessories

## 23-400 & 23-450 Series



### Stainless Steel Liquid Level Gauges

Ideal for handling alcohol solvents, acetic acid and ketones. Automatic models conform to ASME requirements; aluminum and composition handwheels.

- PTFE reinforced gauge glass gaskets, stem packings
- Chemical resistant PTFE seat
- 5/16 dia. full flow all SS drain valve with safety handle
- Guard rod bracket to accommodate four SS guard rods
- Rated 500 psig @ 450°F (See note!)
- High pressure gauge glass standard
- CRN Registered

	Model Number	Pipe Size (In.)	Glass O.D. & Length	Wt./100 (Lbs.)	Wheel Type
Non-Automatic	23-401-00	1/2	5/8 x 12	385	ALUMINUM
	23-402-00	1/2	5/8 x 12	385	COMPOSITION
	23-404-00	3/4	3/4 x 16	450	ALUMINUM
	23-405-00	3/4	3/4 x 16	450	COMPOSITION
Automatic	23-450-00	1/2	5/8 x 12	390	ALUMINUM
	23-451-00	1/2	5/8 x 12	390	COMPOSITION
	23-453-00	3/4	3/4 x 16	455	ALUMINUM
	23-454-00	3/4	3/4 x 16	455	COMPOSITION

*Note: Service ratings are subject to pressure/temperature ratings of gauge glass and glass gaskets.*



### Tubular Gauge Glass Protector

Reduces risk of injury and damage from broken exploding glass; maximum length: 50".

- No. I-2733\* 5/8" Glass Protector
- No. I-2734\* 3/4" Glass Protector
- Made to fit most water gauges
- Not available on 23-400, 23-650, 24-300, 24-600 models
- CRN Registered

*Note: Water gauge part number and centerline length are required when ordering. Priced according to length and application.*

# Water Gauges & Accessories

## Ordering Water Gauge Glasses & Guard Rods

- Standard, Red Line and High Pressure glass, sizes 5/8" and 3/4", are available in lengths to 72"
- 3/16 diameter guard rod lengths from 6" to 74"
- Call for more pressure and temperature ratings

### Formula for determining glass and rod lengths

- Glass Length = (C to C Dimension) - 1-1/4"
- Rod Length = (Glass Length) + 2"

### Exceptions

(20-300, 20-350, 20-601, 20-602, 23-650, 24-300, 24-350, 25-400, 25-500, 25-600)

- Glass Length = (C to C Dimension) - 2"
- Rod Length = (Glass Length) + 1-1/4"

(24-600, 24-650)

- Glass Length = (C to C Dimension) - 2"
- Rod Length = (Glass Length) + 7/8"

(20-207, 20-208, 20-253, 20-254)

- Glass Length = (C to C dimension) - 1-1/2"
- Rod Length = (Glass length) + 2-1/4"

(23-400, 23-450)

- Glass Length = (C to C dimension) - 2"
- Rod Length = (Glass length) + 3-1/4"

### Suffix Key

- 00- Standard Gauge w/Standard Glass & Rod
- 01- Top only
- 02- Bottom only
- 03- Standard Gauge Less Glass and Rod
- 10- For Special Gauges and Gauges with Non-Standard Glass and Rod Lengths

**NOTE!** Service ratings are subject to pressure/temp. ratings of gauge glass and gaskets. Regular gauges use standard glass unless otherwise noted as high pressure.

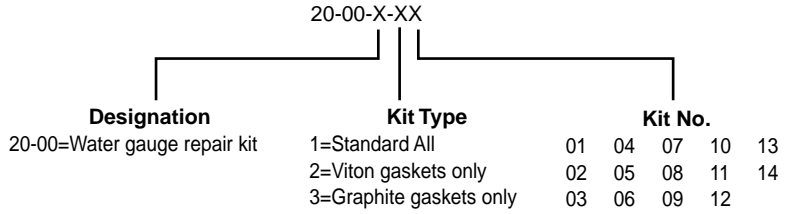
## Gauge Glass Service Pressure-Temperature Ratings

Size (In.)	Length (In.)	Temperatures Up to 150°F No Corrosion	Steam Boiler Services up to 425°F
<b>Standard</b>			
5/8 O.D.	08.00	210.00	100
+0, -3/64	10.00	210.00	100
	12.00	205.00	100
Wall	14.00	200.00	100
5/64±1/64	16.00	195.00	100
3/4 O.D.	08.00	210.00	100.00
+0, -3/64	10.00	210.00	100.00
	12.00	205.00	100.00
	14.00	200.00	100.00
	16.00	195.00	100.00
<b>High Pressure</b>			
5/8 O.D.	08.00	435.00	320
+0, -1/32	10.00	420.00	315
	12.00	410.00	305
Wall	14.00	390.00	295
3/32 ±1/64	16.00	375.00	285
3/4 O.D.	08.00	425.00	315
+0, -1/32	10.00	410.00	310
	12.00	400.00	300
Wall	14.00	385.00	290
3/32 ±1/64	16.00	370.00	280
<b>Red Line</b>			
5/8 O.D.	08.00	370.00	285
+0, -1/32	10.00	345.00	280
	12.00	335.00	280
Wall	14.00	325.00	275
3/32 ±1/64	16.00	315.00	270
3/4 O.D.	08.00	360.00	280
+0, -1/32	10.00	340.00	275
	12.00	330.00	275
Wall	14.00	320.00	270
3/32±1/64	16.00	310.00	265

# Water Gauges & Accessories

## Water Gauge Repair Kits

### Repair Kit Ordering Information



Kit	Applications	Kit	Applications
20-001-01, 20-003-01	20-101, 20-102, 20-104, 20-105, 20-150, 20-151, 20-405, 20-406, 20-407, 20-408, 20-410, 21-101, 21-102, 21-104, 21-105, 21-150, 21-151	20-002-01	20-101, 20-102, 20-104, 20-105, 20-150, 20-151, 20-201, 20-202, 20-204, 20-205, 20-250, 20-251, 20-304, 20-305, 20-350, 20-351, 20-410, 20-601, 20-604, 20-605, 20-703, 20-713, 20-704, 20-714, 20-804, 20-805, 21-101, 21-102, 21-104, 21-105, 21-150, 21-151, 21-204, 21-205, 21-251, 23-651, 23-654, 25-201, 25-202, 25-204, 25-205, 25-404, 25-405, 25-501, 25-502
20-001-02, 20-003-02	20-201, 20-202, 20-204, 20-205, 20-250, 20-251, 20-304, 20-305, 20-350, 20-351, 20-604, 20-605, 20-804, 20-805, 21-204, 21-205, 21-250, 21-251, 25-201, 25-202, 25-204, 25-205, 25-404, 25-405, 25-501, 25-502	20-002-02	20-207, 20-208, 20-253, 20-254, 20-307, 20-308, 20-353, 20-354, 25-207, 25-208, 25-407, 25-408, 25-504, 25-505
20-001-03, 20-003-03	20-207, 20-208, 20-253, 20-254, 20-307, 20-308, 20-353, 20-354, 25-207, 25-208, 25-407, 25-408, 25-504, 25-505	20-002-03	20-207, 20-208, 20-253, 20-254, 20-307, 20-308, 20-353, 20-354, 20-602, 25-207, 25-208, 25-407, 25-408, 25-504, 25-505, 25-602
20-001-04, 20-003-04	20-601, 25-601	20-002-04	23-401, 23-402, 23-450, 23-451, 24-301, 24-302, 24-350, 24-351, 24-451, 24-601, 24-651, 24-751, 24-851
20-001-05, 20-003-05	20-602, 25-602		23-404, 23-405, 23-453, 23-454, 24-304, 24-305, 24-353, 24-354, 24-453, 24-454, 24-602, 24-652, 24-752, 24-852
20-001-06, 20-003-06	20-703, 20-704, 20-713, 20-714		
20-001-07, 20-003-07	23-401, 23-402, 23-450, 23-451		
20-001-08, 20-003-08	20-405, 20-406, 20-407, 20-408		
20-001-09, 20-003-09	23-404, 23-405, 23-453, 23-454		
20-001-10, 20-003-10	23-651, 23-654		
20-001-11, 20-003-11	24-301, 24-302, 24-350, 24-351, 24-450, 24-451		
20-001-12, 20-003-12	24-304, 24-305, 24-353, 24-354, 24-453, 24-454		
20-001-13, 20-003-13	24-601, 24-651, 24-751, 24-851		
20-001-14, 20-003-14	24-602, 24-652, 24-752, 24-852		

Standard repair kits and graphite repair kits contain glass packing, stem packing, friction washers, seat washers, and drain washer applicable to the particular valve. Three types of glass packing, EPDM rubber, Hypalon™, and PTFE, are included in the standard repair kit. For oil related service, Fluoroelastomer (Viton®) glass gasket sets are available. For severe applications, graphite glass gaskets and stem packing sets are available for each model.

Note: For additional information on water gauges see Water Gauge Catalog PHBRWGA.

## 26-100 & 26-300 Series



26-300

### Compression Gauge Cocks

For draining expansion tanks, other liquid storage vessels.

- **26-100:** rated up to 125 psig
- **26-300:** soft metal seat/stuffing box rated up to 250 psig
- **26-310:** stainless steel ball seat/stuffing box rated up to 250 psig

Model Number	Pipe Size (In.)	Wt./100 (Lbs.)	Wheel Type
26-101	3/8	25.0	ALUMINUM
26-102	3/8	30.0	COMPOSITION
26-104	1/2	28.3	ALUMINUM
26-105	1/2	30.0	COMPOSITION
26-301	3/8	39.0	ALUMINUM
26-302	3/8	40.0	COMPOSITION
26-304	1/2	40.0	ALUMINUM
26-305	1/2	44.0	COMPOSITION
26-307	3/4	49.0	ALUMINUM
26-308	3/4	51.7	COMPOSITION
26-311	3/8	39.0	ALUMINUM
26-312	3/8	42.0	COMPOSITION
26-314	1/2	40.0	ALUMINUM
26-315	1/2	44.0	COMPOSITION
26-317	3/4	50.0	ALUMINUM
26-318	3/4	50.0	COMPOSITION

\*26-100 series is not available with packing nut  
Specify the following suffix for finish: 01 - Satin Brass; 28 - Polished Brass.

# Water Gauges & Accessories

## 26-500 Series



### Chain Operated Gauge Cocks

For use on water columns beyond reach from the floor.

- Spring loaded lever
- PTFE seat
- Optional 6-foot chain (suffix -02)
- Rated up to 250 psig

Model Number	Size (In.)	Wt./100 (Lbs.)
26-504-01	1/2	110
26-507-01	3/4	115

## 26-700 Series



### PTFE Seat Compression Gauge Cock

PTFE seat and stuffing box provide positive seal.

- Rated up to 250 psig

Model Number	Size (In.)	Wt./100 (Lbs.)	Wheel Type
26-704-01	1/2	078.0	ALUMINUM
26-705-01	1/2	081.5	COMPOSITION
26-707-01	3/4	088.0	ALUMINUM
26-708-01	3/4	105.0	COMPOSITION